

REMARKS

Applicant has amended claim 1 to include all the limitations of claim 4. The Examiner previously rejected claims 4 and 5 as obvious over Lowe (U.S. Patent No. 5,673,018) in view of Srygley (U.S. Patent No. 5,524,034). Further, it would not be obvious to modify Lowe in view of Srygley, because Lowe include an RF transponder which receives power wirelessly, as is known. It would not be obvious to include the batter of Srygley in the transponder system of Lowe. Therefore, claims 4 and 5 are allowable. Srygley does not disclose a power source that generates power based upon motion (previously in claim 5). Rather, Srygley clearly shows in Figure 5 a battery ("unregulated power") which powers the microcontroller. Thus, the power source does not generate power based upon motion.

The Examiner has rejected claims 11, 12, 15-18 and 21-31 as obvious over Lowe in view of Davis (U.S. Patent No. 5,177,685). Lowe discloses a system for reporting the distance traveled by a wheeled vehicle, without having to manually read an odometer. A rotation sensor and a transponder are mounted on the wheel of the vehicle whose driving distance is to be determined. Thus, when a rental vehicle is returned, the distance traveled by the vehicle can be determined (column 1, lines 13-17). Davis discloses an automobile navigation system. The Examiner has offered no motivation for modifying the transponder system of Lowe to include a navigation system, such as Davis. Nor is it clear how Examiner's proposed combination would meet the claimed elements. The position keeping (dead reckoning) system of Davis does not utilize wireless signals. Rather the position keeping system of Davis utilizes the odometer and the compass or gyroscope or differential odometer to implement dead reckoning. In fact, in Davis, the navigation system is connected to the odometer in order to obtain vehicle displacement for the position keeping system. (column 11, lines 60-62). The position finding system (such as a GPS system) in Davis utilizes a wireless signal; however, it is completely different from the wireless signal utilized in Lowe. The wireless signal in Lowe could not be utilized for position finding (as

that term is used in Davis), i.e. the wireless signal in Lowe could not be used as a GPS signal. Therefore, the device of Lowe could not be utilized in the Davis system.

Referring to claim 21 in particular, the Examiner admits that Lowe does not disclose means for calibrating said wireless signal to vehicle displacement. In fact, the Examiner points out that Davis indicates that a position system with no air could be calibrated when installed. However, Davis does not disclose how to calibrate the wireless signal to vehicle displacement. First, the system of Davis would not need the transponder of Lowe because Davis already includes an odometer signal that would provide the displacement information. Second, Davis does not disclose calibrating the odometer signal; rather, Davis assumes the odometer signal is accurate. Therefore, calibrating the wireless signal to vehicle displacement is claimed in claim 21 is neither disclosed nor obvious from the cited references. Therefore, claim 21 is properly allowable.

Claim 22 specifically claims means for dead reckoning a position of a vehicle based upon the wireless signal. Again, since the Davis system already obtains displacement information from the vehicle odometer, there will be no need to utilize a transponder such as Lowe to provide distance information. It is only Applicant's invention which recognizes the advantage of using a wireless distance sensor in a navigation system, thus permitting easy installation of a vehicle navigation system, without the need to connect to the vehicle odometer system, which is difficult. Therefore, claim 22 is neither disclosed nor obvious.

With respect to claim 23, again it would not be obvious to include the transponder of Lowe in the Davis navigation system, since Davis is already obtaining displacement information from the vehicle odometer. Therefore, claim 23 is not obvious.

The Examiner has rejected claim 19 as obvious over Lowe in view of Davis in further in view of Maples (U.S. Patent No. 4,833,281). Applicant has explained above, why it would not be obvious to modify Lowe in view of Davis. Further, the system of Maples could not be utilized in combination with Lowe and Davis. Maples discloses a simple motion detector for use in the transmitter of the vehicle keyless entry system. When motion

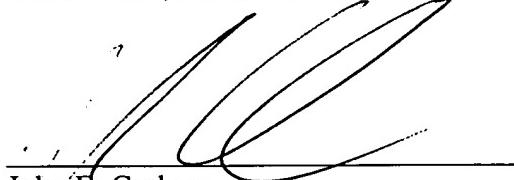
is detected, the keyless entry system transmits its coded signal to obtain entry to the vehicle. Thus, when the driver is at rest, the transmitter circuit can be turned off, thus reducing power consumption. All though the Maples system discloses a moveable mass, it is unclear how this could be incorporated into the Lowe device, or how it could be utilized to calculate vehicle displacement. Therefore, claim 19 is not obvious.

The Examiner has objected to the drawings. Replacement drawings with additional labels included in red are attached.

A check in the amount of \$110.00 is enclosed for a one month extension of time. If any additional fees or extension of times are required, please charge to Deposit Account No. 50-1482.

Respectfully submitted,

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Version with markings to show changes made

Please cancel claim 4.

Please amend the following claims:

1. (Amended) A vehicle displacement sensor comprising:

a wireless transmitter including a power source generating a wireless signal indicative of a vehicle displacement; and
a wireless receiver receiving said wireless signal from said transmitter.

5. (Amended) The vehicle displacement sensor of claim [4] 1 wherein said power source generates power based upon motion.

9. (Amended) The vehicle displacement sensor of claim [9] 8 wherein said fixed number is one.

17. (Amended) The vehicle displacement sensor of claim [19] 11 wherein said fixed number is one.